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(71) Applicant(s)

Samsung Electronics Company Limited
(Incorporated in the Republic of Korea)
416 Maetan-dong, Paldal-gu, Suwon-city,
Kyungki-do, Republic of Korea

(72) Inventor(s)

Jung Sik Choi
Hong Ki Kim
Dong Jun Lee
Dae Won Kang
Sang Mun Chon
Jung Ho Lee

(74) Agent and/or Address for Service

Marks & Clerk
57-60 Lincoln's inn Fields, LONDON, WC2A 3LS,
United Kingdom

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(54) Abstract Title

Spin-on glass composition and method of forming silicon oxide layer

(57) A silicon oxide layer is formed by coating on a semiconductor substrate having a surface discontinuity, an SOG composition containing perhydropolysilazane having a compound of the formula $-(\text{SiH}_2\text{NH})_n-$ wherein n represents a positive integer, a weight average molecular weight within the range of about 4,000 to 8,000, and a molecular weight dispersion within the range of about 3.0 to 4.0, to form a planar SOG layer. The SOG layer is converted to a silicon oxide layer with a planar surface by curing the SOG layer. Solvent is present in the composition in an amount of 70-90% by weight.

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